STAT

July 10, 1964

LINEAR PHASOLVER MEASURING ENGINE

STAT

Everything is waiting on the driver master patterns being made by STAT
The Phasolver electronics are complete and have been tested for accuracy and drift. They were packaged in a small console, operated with the old patterns and were found to work satisfactorily.

made a trip East in June and visited STAT
He talked to there. At the time of STAT
visit, had made five driver masters and was working STAT
on the sixth. They were not yet successful. first STAT
makes a single-cycle sine-wave master at about four times size by step positioning and exposing a narrow slit. They have no trouble with this operation and have made several of the small plates. The single-cycle master is then reproduced on the final master at a 4:1 reduction by manual step and repeat indexing.

They tried an automatic step and repeat but it did not work out. There are 200 steps per pattern and five patterns on the 10-in. long plate, thus 1000 manual operations are required. They are having trouble doing this without error. However, received a call from on Thursday, STAT
July 9, saying he had successfully made two complete masters. He is airmailing one to and sending STAT
one to for their inspection. STAT
is to prepare the working driver from driver STAT
master.

that they had made STAT
one coupler. The coupler is a series of conducting bars plated on a 26-in. long glass plate. Measurements indicated the accuracy was just barely good enough. On checking back, found the temperature variations were wide, so STAT
they stripped the plate and will do it over. expects STAT

DDR - DUPE

to complete the coupler plate next week. [redacted] received the cost overrun funds so there is no interruption to the work. STAT

Based on receiving the driver master from [redacted] next week and barring other mishaps, [redacted] thinks they will be ready for the feasibility demonstration in October. I think it would be advantageous for [redacted] (and, if possible, [redacted] [redacted] to see the feasibility demonstration and participate in the discussion and evaluation. To be effective, though, they must do their homework. They must familiarize themselves with the present project and be prepared to discuss specifics of implementation of the results. I recommend that [redacted] and, if possible, [redacted] accompany [redacted] to witness the feasibility demonstration of submicron measurement. STAT STAT STAT STAT STAT STAT STAT

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